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APPLICATION ÑO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
. 09/889,023	01/10/2002	Toshihiro Morita	450101-02844	4611
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William S Fron	mmer		CHEN,	TE Y
Frommer Lawrence & Haug 745 Fifth Avenue			ART UNIT	PAPER NUMBER
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Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary		Application No.	Applicant(s)		
		09/889,023	MORITA ET AL.		
		Examiner	Art Unit		
		Susan Y Chen	2171		
 Period for	The MAILING DATE of this communication app Reply	ears on the cover sheet with the c	orrespondence address		
THE M - Extens after Si - If the p - If NO p - Failure - Any rep	RTENED STATUTORY PERIOD FOR REPLY AILING DATE OF THIS COMMUNICATION. ions of time may be available under the provisions of 37 CFR 1.13 X (6) MONTHS from the mailing date of this communication. eriod for reply specified above is less than thirty (30) days, a reply eriod for reply is specified above, the maximum statutory period w to reply within the set or extended period for reply will, by statute, ply received by the Office later than three months after the mailing patent term adjustment. See 37 CFR 1.704(b).	within the statutory minimum of thirty (30) days ill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).		
1)⊠ F	Responsive to communication(s) filed on <u>16 De</u>	ecember 2002.			
2a) <u> </u>	This action is <b>FINAL</b> . 2b)⊠ This action is non-final.				
	Since this application is in condition for allowan closed in accordance with the practice under <i>E</i>				
Dispositio	n of Claims				
5)□ ( 6)⊠ ( 7)□ (	Claim(s) 41-66 is/are pending in the application a) Of the above claim(s) is/are withdraw Claim(s) is/are allowed. Claim(s) 41-66 is/are rejected. Claim(s) is/are objected to. Claim(s) are subject to restriction and/or	vn from consideration.			
Applicatio	•				
10)□ T A F	he specification is objected to by the Examiner he drawing(s) filed on is/are: a) acception acception and acception and a specific and any objection to the objectment drawing sheet(s) including the correction and or declaration is objected to by the Examine.	epted or b) objected to by the Edrawing(s) be held in abeyance. See on is required if the drawing(s) is obj	e 37 CFR 1.85(a). ected to. See 37 CFR 1.121(d).		
	ider 35 U.S.C. §§ 119 and 120				
12) A a) A a a a a a a a a a a a a a a a a	Acknowledgment is made of a claim for foreign All b) Some * c) None of:  Certified copies of the priority documents Copies of the certified copies of the priority documents copies of the certified copies of the prioriapplication from the International Bureause the attached detailed Office action for a list of knowledgment is made of a claim for domestic ce a specific reference was included in the first CFR 1.78.  The translation of the foreign language proknowledgment is made of a claim for domestic cerence was included in the first sentence of the cerence was included in the first sentence of the cerence was included in the first sentence of the cerence was included in the first sentence of the cereaction.	s have been received. s have been received in Application ity documents have been received (PCT Rule 17.2(a)). of the certified copies not received priority under 35 U.S.C. § 119(a) t sentence of the specification or evisional application has been received priority under 35 U.S.C. §§ 120	on No  ed in this National Stage  ed.  e) (to a provisional application)  in an Application Data Sheet.  eived.  and/or 121 since a specific		
Attachment(s	5)				
2) Notice	of References Cited (PTO-892) of Draftsperson's Patent Drawing Review (PTO-948) ation Disclosure Statement(s) (PTO-1449) Paper No(s) <u>6</u> .		(PTO-413) Paper No(s) atent Application (PTO-152)		

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#### **DETAILED ACTION**

### Claim Status

1. Claim 41-66 are pending for examination per the preliminary amendment filed on 10/07/2001.

### **Priority**

2. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d) or (f), the copies of the certified copies of the priority documents have been placed of record in the application folder.

### Information Disclosure Statement

3. The information disclosure statement filed on 12/16/2002 complies with the previsions of 37 CFR 1.97 1.98 and MPEP § 609. It has been placed in the application file. The information referred to therein has been considered as to the merits. (see attached PTO-1449 form).

### **Specification**

4. It is noted that the present specification does not contain line numbers. For ease of reference by both Examiner and Applicant <u>all</u> future correspondence should include the line numbering. A recommend format for numbering the claims is to number each line of each claim with a new starting line number. Also, the specification has not been

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checked to the extent necessary to determine the presence of all possible minor errors.

Applicant cooperation is requested in correcting any errors of which applicants may become aware in the specification.

### **Drawings**

5. Applicant has filed informal drawings which are acceptable for examination purposes only. Formal drawings will be required when the application is allowed.

### Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 6. Claims 41, 43, 48, 50, 53, 55, 57, 60, 62 and 64, are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. Patent No. 6,412,012 issued to Bieganski et al. (hereinafter referred as '012 Bieganski).

Claims 41 and 48:

Bieganski discloses a digital data recommendation system [e.g., Fig. 1] comprising:

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means for recording usage history data and the related data recorded in the recording means based on the filtering data [e.g., the CPU (102, Fig. 1) can coupled to the memory system (104, Fig. 1) and the secondary storage(108 of Fig. 1) to log history data indicative of usage history of the group of contents. For example, the data being stored in the History Set (203), Fig. 2; or the customer's behavior data recorded at a shopping set being specified at col. 8, lines 7-8; or the Purchased Items associated to a particular user's Transaction or the total number of Transaction being purchased of 900), Fig(s). 9; the Recommendation engine (600, Fig. 14; col. 14, lines 31-33)];

means for computing per each of the contents a weight related to a number of checkout from the history data and the related data recorded in the recording means based on the filtering data [e.g., the compatibility modifier (200, Fig. 2) can accept a stored number of checkout (or the number of times each item was purchased, Fig. 9) per each of the contents from the history data on a filtering rule specified by a marketer or customer or the processing of recommendation engine itself (col. 9, lines 63-49) to compute a weight related to the number of checkout (the steps 752-756, Fig. 7A)];

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- means for selecting a content from a group of contents based on weight computed by the computing means [e.g., the user interface adapter coupled to the Input Device (114, 118, Fig 1) can be used to select the modified recommendation set based on weight computed by the compatibility modifier (Fig. 5; Fig. 6; col. 13, line 21 - col. 14, line 14; col. 14, line 31-col. 15, line 2)];
- means for display a list of at least titles in the information related
  to the contents selected by the selecting means [e.g., the Display
  Adapter (112, Fig. 1) coupled to the Display Device (116, Fig. 1)
  can display a list of recommended books selected by the book
  reviewer (col. 7, lines 49-54)].

As to claims 53, 55, 60 and 62:

these claims recite the same features as claims 41 and 48, in form of computer method / program storage medium, hence are rejected for the same reason.

### As to claims 43 and 50:

Bieganski discloses all the features as claimed by applicant in claims 41 and 48. He further teaches the system having means [e.g., the User Input device (118), Fig. 1] to add new filtering data [e. g., the complement items in the shopping set, or the complement items in the historical and original

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recommendation set are added to the recommendation process at the modules: 452-456, Fig. 4A; col. 11, lines 14-32; lines 40-56].

As to claims 57, and 64:

these claims contain the same features as their base claim and recite the same features as claims 43 and 50, in form of computer method / program storage medium, hence are rejected for the same reason.

### Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 7. Claims 42, 44-47, 49, 51-52, 54, 56, 58-59, 61, 63, 65-66, are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 6,412,012 issued to Bieganski et al. (hereinafter referred as Bieganski) in view of U.S. Patent No. 6,662,231 issued to Drosset et al. (hereinafter referred as Drosset).

#### As to claim 42:

Bieganski discloses all the features as claimed by applicant in claim 41.

Bieganski further discloses means for computing a weight related to an item per each of the contents from the related data based on the filtering data.

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Furthermore, he teaches that observing a customer's shopping behavior to create a shopping set as filtering input to the compatibility modifier for guiding the modifier to apply the shopping set data as filtering criteria for computing a weight to the data item based on a particular application [e.g., col. 9, lines 63 – col. 10, line 43]. In addition, he cited his compatibility—aware system can enhance the internet audio entertainment service system with benefit of compatibility modified recommendations [col. 19, lines 55 –col. 20, line 7].

Bieganski did not expressly cite to compute a weight for a period for which the content has been checked out.

However, Drosset discloses a system providing audio service over a communication network [Drosset: Title] therein, the system measures duration for which the content has been checked out [e.g., the play-out time of Fig. 4; the step (404, Fig. 10); the step (430, Fig. 11); col. 8, line 10 – line 36].

Thus, considering the combination of Bieganski and Drosset, it would have been obvious to one of the ordinary skill person in the art at the time the invention was made to further modify the combined system of Bieganski and Drosset by computing a weight for a period for which the content has been checked out.

The ordinary skilled artisan would have been motivated to modify the combination of Bieganski and Drosset per computing a weight of a period for which the content has been checked out for the following purposes: 1) facilitating the combined system to track the cost of certain play-out time for the content has

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been check-out from an audio entertainment service system [e.g., Drosset: Abstract, lines 7-10]; 2) using the computed weight for the duration of play-out time as a filtering rule to enhance the recommendations of the audio entertainment service system [e.g., Bieganski: Abstract, lines 5-11; col. 19, lines 55-7].

## As to claim 44:

Bieganski discloses the features claimed by applicant as following:

- means [e.g., Bieganski: Fig. 1; col. 1, lines 35-40; the Recommendation engine (600), Fig. 14, col. 14, lines 31-33] for recoding related about the group of contents [e.g., Bieganski: the Purchased Items of a Transaction & total number of Transaction being purchased (900), Fig(s). 9] and filtering data intended for computation of a weight per each of the contents [e.g., Bieganski: the item compatibility rules (204), Fig. 2, col. 7, lines 21-24];
- means for computing a weight based on the filtering data [e.g., the compatibility rule specified by a marketer or customer or the processing of recommendation engine itself (col. 9, lines 63-49)
   can be input to the compatibility modifier (200, Fig. 2) to compute a weight per each item of contexts; the steps: 752-756, Fig. 7A];
- means [e.g., Bieganski: the user Interface Adapter (114) or the
   user Input Device (118), Fig 1] for selecting a content from a

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means [e.g., Bieganski: the user Interface Adapter (114) or the user Input Device (118), Fig 1] for selecting a content from a group of contents [e.g., Bieganski: the recommendation set, col. 10, line 66] based on weight (or strength or ranking or score) [e.g. Bieganski: col. 2, line 66 - col. 3, line 7] computed by the computing means [e.g., Bieganski: the Compatibility-Aware Recommendation Engine (600, Fig. 6); col. 10, lines 14 -, lines 31-33, lines 38-49; Fig(s). 7A-B];

means [e.g., Bieganski: the Display Adapter (112), the display (116), Fig. 1] for display a list of at least titles in the information related to the contents selected by the selecting means [e.g., Bieganski: the displayed list of recommended books selected by the book reviewer via the user input Device (118, Fig. 1), col. 7, lines 49-54].

Bieganski did not specifically disclose computing a weight related to playing time.

However, Drosset discloses computing a playing time per each of the contents from the related data [e.g., Drosset: the step (404), Fig. 10; the step(434), Fig. 11; Fig. 4].

Thus, considering the combination of Bieganski and Drosset, it would have been obvious to one of the ordinary skill person in the art at the time the invention was made to further modify the combined system of

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Bieganski and Drosset by computing a weight for a period for which the content being played.

The ordinary skilled artisan would have been motivated to modify the combination of Bieganski and Drosset per computing a weight of a period for which the content being played for the following purposes: 1) facilitating the combined system to track the cost of certain elasped time for the content has been played from an audio entertainment service system [e.g., Drosset: Abstract, lines 7-10]; 2) using the computed weight for the duration of play-out time as a filtering rule to produce a compatibility-aware recommendation output set for the audio entertainment service system [e.g., Bieganski: Abstract, lines 5-11; col. 19, lines 55-7].

### As to claim 45:

The combined system of Bieganski and Drosset discloses all the features as claimed by applicant in claim 44. Bieganski further disclose computing a weight related to the genre of the content [e.g., Bieganski: the priority ranking processing at col. 10, lines 6-17].

#### As to claim 46:

The combined system of Bieganski and Drosset discloses all the features as claimed by applicant in claim 44, Bieganski further discloses computing a

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weight related to the character included in the name of the content [e.g.,

Bieganski: col. 18. line 64 – col. 19, line 3].

### As to claim 47:

The combined system of Bieganski and Drosset discloses all the features as claimed by applicant in claim 44, Bieganski further discloses the system having means [e.g., the User Input device (118), Fig. 1] to add new filtering data [e.g., the complement items in the shopping set, or the complement items in the historical and original recommendation set are added to the recommendation process at the modules: 452-456, Fig. 4A; col. 11, lines 14-32; lines 40-56].

### As to claim 49:

This claim draws to the same features cited in the claims: 42 and 48, hence is rejected for the same reason.

As to claims 52, 54, 56, 59, 61, 63 and 66:

These claims contain the same features as in their base claims 48, 53, 55, 60 and 62 respectively. They further recite the same feature of claim 42 except in form of computer method / program storage medium, hence are rejected for the same reason

As to claims 51, 58, and 65:

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These claims contain the same features as in their base claims 48, 55 and 62 respectively. They further recite the same features as claim 45 except in form of computer method / program storage medium, hence is rejected for the same reason.

### Conclusion

- 8. To expedite the process of re-examination, the examiner requests that all future correspondences in regard to overcoming prior art rejections or other issues (e.g. 35 U.S.C. 112) set forth by the Examiner prior to the office action, that applicant should provide and link to the most specific page and line numbers of the disclosure where best support is found (see 35 U.S.C. 132).
- 9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure: U.S. Patent No. 6,645,067 issued to Okita et al., which disclosed an audio/video system to provide entertainment service to client; U.S. Patent No. 6,173,280 issued to Ramkumar et al., which disclosed a data mining system to generate weighted association rules.

#### Inquiry

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Susan Y Chen whose telephone number is (703) 308-1155. The examiner can normally be reached on Monday - Friday from 7:00-4:30.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Safet Metjahic can be reached on (703) 308-1436. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)308-3900.

Susan Chen Jan. 22, 2004 MC 1/22/04